ROTATIONAL STUDY OF NATURAL AMINO ACID GLUTAMINE

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Recent improvements in laser ablation molecular beam Fourier transform microwave spectroscopy (LA-MB-FTMW) have allowed the investigation of glutamine (COOH-CH(NH_2)-CH_2-CH_2-$CONH_2$), a natural amino acid with a long polar side chain. One dominant structure has been detected in the rotational spectrum. The nuclear quadrupole hyperfine structure of two ^{14}N nuclei has been totally resolved allowing the conclusive identification of the observed species.